DOCUMENT RESUME

ED 240 248 CE 037 831

AUTHOR Russell, Russ
TITLE Vocational Education and Training in the Federal Republic of Germany. Comparative Papers in Further Education. Number Ten.
INSTITUTION Further Education Staff Coll., Blagdon (England).
REPORT NO ISBN-0-907659-04-7
PUB DATE 83
NOTE 55p.; For related documents, see CE 037 824-827 and CE 037 829-832.
AVAILABLE FROM Publications, Further Education Staff College, Coombe Lodge, Blagdon, Bristol BS18 6RG England.
PUB TYPE Reports - Descriptive (141)

EDRS PRICE MF01/PC03 Plus Postage.
DESCRIPTORS Adult Education; Apprenticeships; Career Guidance; *Education Work Relationship; Elementary Secondary Education; Foreign Countries; Job Training; On the Job Training; Postsecondary Education; *Vocational Education
IDENTIFIERS *West Germany

ABSTRACT

Since the states of the Federal Republic of Germany enjoy autonomy regarding all educational matters, coordination is ensured by various commissions and ministries. Compulsory full-time education from ages 6 to 15 is followed by compulsory part-time release until age 18. Education is divided into primary, lower secondary, upper secondary, and higher. The basic system of vocational education and training is the Dual System, under which a young person on a training contract or apprenticeship receives vocational training in the firm while attending a vocational school. The upper secondary system is divided into vocational schools and general education and "mixed-type" schools. Adult Education Institutes provide a wide variety of leisure, cultural, and vocational studies. (Brief overviews are offered on teachers, examinations, and curriculum coordination.) The country has responded with five sets of measures to solve the problems of the transition from school to working life: the curriculum component, learning about the world of work, vocational guidance, the vocational orientation year, a basic vocational training year, and apprenticeships. Problems of the 1980s include graduate unemployment and need for labor force flexibility. Appendixes include a typical plan of the states' educational systems, a glossary, and background information on the country. (YLB)

****
* Reproductions supplied by EDRS are the best that can be made *
* from the original document. *
****

U.S. DEPARTMENT OF EDUCATION
NATIONAL INSTITUTE OF EDUCATION
EDUCATIONAL RESOURCES INFORMATION CENTER (ERIC)

☑ This document has been reproduced as received from the person or organization originating it.

☐ Minor changes have been made to improve reproduction quality.

• Points of view or opinions stated in this document do not necessarily represent official NIE position or policy.

"PERMISSION TO REPRODUCE THIS MATERIAL HAS BEEN GRANTED BY

P Rawlings

TO THE EDUCATIONAL RESOURCES INFORMATION CENTER (ERIC)."

ISSN 0143-327X

ISBN 0-907659-04-7

Comparative Papers in Further Education

Series Coordinator
Publications Editor: **David Parkes**
Jean Finlayson

Secretaries **Molly Higgs**
Joan Metherell

©1983 Copyright The Further Education Staff College

Coombe Lodge Staff

Director: **Gordon Wheeler**
Deputy Director: **Derek Birch**
Registrar & Clerk to the Governors: **John Roberts**
Librarian: **Penny Rawlings**

COMPARATIVE PAPERS IN FURTHER EDUCATION NUMBER TEN

Vocational Education and Training in the Federal Republic of Germany

by Russ Russell

Contents

		Page
	PREFACE	2
I	THE ADMINISTRATION OF EDUCATION	3
II	THE EDUCATION SYSTEM	5
III	THE DUAL SYSTEM	8
IV	THE UPPER SECONDARY SYSTEM	13
V	CONTINUING AND ADULT FURTHER EDUCATION	17
VI	THE TEACHERS	19
VII	EXAMINATIONS	21
VIII	THE CURRICULUM	22
IX	THE PROBLEMS OF THE TRANSITION FROM SCHOOL TO WORKING LIFE	24
X	PROBLEMS OF THE EIGHTIES	26
APPENDIX A	References	27
APPENDIX B	Structure of the KMK	29
APPENDIX C	Plan of the Educational Systems of the Länder of the FRG	31
APPENDIX D	The Process of Harmonisation of Training Regulations	33
APPENDIX E	Glossary	36
APPENDIX F	Bibliography	39
APPENDIX G	The Economy, the Länder	41
APPENDIX H	Some useful addresses	46

Preface

This paper was originally prepared as a briefing paper for an Anglo-German seminar on common aspects of the curriculum in the vocational educational systems of England and Wales and the Federal Republic of Germany, a seminar funded jointly by the Anglo-German Foundation for the Study of Industrial Society and the British Council. It has been revised as a result of further study, funded by the British Council and the CBEVE and is presented here as an introductory guide to further study.

It is written on a minimum-translation basis because, whatever the similarities of the problems they face and the solutions they adopt, there is never an exact equivalent in two educational systems. In the end systems must be understood in their own terms. An approximate translation is given after the introduction of each German term, but not repeated except in the glossary-appendix at the end. Further appendices contain a suggested reading list for further study, and a fairly full list of addresses for contact.

In preparing this text I have drawn extensively on the publication of the Kultusministerkonferenz, the Bundesinstitut für Berufsbildung, the Bundesministerium für Bildung and Wissenschaft, the Bundesanstalt für Arbeit, various Kultusministerien of the Länder, and on discussions with many of their officers. Their assistance is gratefully acknowledged. In addition I gratefully acknowledge the special contributions to this and earlier versions, of my colleagues David Parkes, Pippa Andrews, Felix Bihlmeier and John Whybrow.

Russ Russell
April 1983

I The Administration of Education

The Federal Republic of Germany comprises the 10 Länder (States) and Berlin (West)[1*] and under the basic constitutional law of 1949 they are responsible for all educational matters. At that stage of the establishment of the Federal Republic there was a distrust of strong central government and a determination to establish the Länder as autonomous in these matters. Some co-ordination is nevertheless needed since for example the Grundgesetz (Constitution, Basic Law) guarantees the freedom of movement, the freedom to choose one's place of work, and one's place of education. Therefore the Länder must co-operate to ensure that the structures, institutions, curricula and leaving certificates are broadly comparable.

The chief organ for co-ordination has been the Ständige Konferenz der Kultusminister der Länder in der Bundesrepublik Deutschland (Standing Conference of the Education Ministers of the Länder of the Federal Republic of Germany) usually known as the Kultusministerkonferenz or the KMK. This was established shortly before the Federal Republic and has made several hundred agreements, being particularly active in the period 1954 to 1964 when much standardisation was achieved. Success here is in part due to the fact that within each Land a tight central control exists. The current structure of the KMK is given as Appendix B.

From 1969 to 1974 great energy was applied by the Federal Government to the establishment of the Bundesministerium für Bildung und Wissenschaft (Federal Ministry of Education and Science), the BMBW, a development regarded with some suspicion by those Länder controlled by the Conservative groups (eg. CDU) since the Federal Government was dominated by Social Democrats (SPD). The BMBW's responsibilities and influence are strictly limited. The Länder protect their independence with some vigour.

Some success however also came from the establishment in 1970 of the Bund-Länder-Kommission für Bildungsplanung und Forschungsförderung (Federal and Länder Commission for Educational Planning and Promotion of Research). In 1973 the Bund-Länder-Kommission produced the Bildungsgesamtplan (general plan for education) which established the whole framework for the co-ordinated development of the entire educational system up to 1985. The detailed proposals for the revision of the plan, drawn up between 1981 and 1983, have been suspended in the current economic and political climate.

---

*All notes are contained in Appendix A

Currently vocational training and its relationships with vocational education are controlled by the two main laws of 1969 and 1981. These are described in Section III of this paper. Under these laws is established the Bundesinstitut für Berufsbildung - BIBB - (Federal Institute for Vocational Education).[2] This organisation has important co-ordination functions in the curriculum which are described in Section VIII of this report. It has a management board representative of employers, employees, crafts and the Bund (Federal Authorities).

The BMBW thus influences vocational education through its relationship with other Federal Ministries, through the BLK, the BIBB and through its sponsorship of experimental or pilot projects and the commissioning of research and evaluation.

The Länder vary greatly in size and population.[3] Their internal administrative patterns also vary. Between the Länder and the individual teaching institution there may be one or both of two levels of administration: Firstly, the Regierungsbezirk (Region) and secondly the Kreis (District). The more rural of these are usually called Landkreis; while the cities may be referred to as Kreisfreie Stadt or just Stadt. Below this, but not affecting the schools, there may be smaller mor local Gemeinde (Local Government). Local participation at Kreis and Gemeinde levels is high with strong expressions of local pride.

II The Education System

At every level change is taking place as a result of the 1973 Bildungsgesamtplan.

Each Land has a slightly different system.[4] A diagram of a basic or typical system is reproduced in Appendix D where there is also a diagram representing the vocational education system in Nordrhein-Westfalen. The basic system may be described as follows:

Compulsory full-time education is from six years to 15 years and this is followed by compulsory part-time (day or block) release until 18 years for students who opt to leave the full-time system. Some Länder are raising the minimum leaving age to 16.

Education is organised into four stages: primary; lower secondary[5]; upper secondary; and higher.

GRUNDSCHULE (PRIMARY)

This comprises Grades 1-4 (6-10 years) except in Berlin where it covers Grades 1-6 (6-12 years).

LOWER SECONDARY

General secondary education up to Grade 9 (age 15) - full-time school leaving age - or Grade 10. Grades 5 and 6 are an orientation stage with syllabuses common to all types of school so children can be easily transferred if their original placement proves unsuitable. Selective schooling is still the norm.

a. Hauptschule (Secondary Modern or Main School) attended by half the age group, and offering classes up to Grade 9 (15 years). The leaving certificate indicating a satisfactory completion of the school work is called the Hauptschulabschluss, giving entry to a variety of trade training and some full-time courses in the second stage secondary education.

b. Realschule (Technical Grammar) attended by a quarter of the age group, and offering classes up to Grade 10 (16 years). Students can then take the Mittlere Reife (Intermediate Certificate) which is an entry qualification to full-time FE (Fachoberschule). Alternatively, students may leave full-time schooling and take up employment, usually

with on-the-job training and with compulsory day-release.

c. Gymnasium (Grammar School) attended by a quarter of the age group, and offering full-time academic courses up to Grade 13 (19 years), preparing students for entry to higher education. Pupils at the end of the course take the Abitur examination which gives access to University and Higher Education. Pupils who leave at the end of the tenth grade with satisfactory performance are regarded as having a Realschulabschluss, or Mittlere Reife.

Through the KMK an agreement has been reached that all Länder shall experiment with the Gesamtschule (Comprehensive School). Full integration is difficult because the leaving certificate for the traditional three types still dominates the employers' minds. Some Länder are more enthusiastic about this provision than others, and have extended their provision to the point where it is difficult to describe it as a pilot scheme.

UPPER SECONDARY

This stage will be considered in detail in Section IV. It comprises Grade II to Grade 13 and includes full-time general academic education at the Gymnasium and full-time and part-time courses in further education which combine general and vocational education. Both come under the secondary school regulations.

HIGHER EDUCATION

The 1976 Hochschulrahmengesetz (HRG) (Higher Education Framework Act) - provides for the reorganisation of higher education into Gesamthochschulen (Comprehensive Universities) or, at the minimum, for the present different types of institutions to co-operate through joint co-ordination committees. There are so far eight Länder Gesamthochschulen: one in Bayern, one in Hessen and six in Nordrhein-Westfalen including the Fernuniversität (Distance University) of Hagen. Elsewhere higher education takes place in several different types of institution, each with its particular functions.

a. Universities and Technical Universities

The Abitur, the leaving certificate of the Gymnasium, used to guarantee a university place. Now pressure on numbers has led to limits on student numbers in certain faculties (especially medical) and often high pass grades are required for entry. Unlike the United Kingdom, a minimum rather than a maximum period of study is stipulated before students can take a University Diplom or First State Examination (1. Staatsexamen). This is at present four years.

b. Pädagogische Hochschulen (Teacher Training Colleges)

The universities provide teacher training courses leading to the 1. Staatsexamen for Gymnasium and Realschule teachers. The Pädagogische Hochschulen provide the training for Hauptschule and Grundschule teachers. Increasingly, however, PHs are being merged with universities.

c. Fachhochschulen (Polytechnics)

These were established in 1970/71 and were formed from Ingenieur Schulen (Engineering Schools) and other specialised school, eg. for business and textiles. They offer three year career orientated courses in 47 recognised specialisations, and these courses are comparable in standard with university courses though they are more practical in approach and therefore a different qualification is awarded at the end. (ie. "Ing.grad" from Fachhochschule, "Dipl.Ing." from university). They are intended for students who have come up through the FE system and possess the Fachhochschulreife (the Leaving Certificate of the Fachoberschule - described in Section III) or an Abitur. Entrants are normally expected to have also some practical training.

d. Kunsthochschulen (Art Colleges) and Musikhochschulen (Music Colleges)

These are specialist colleges of University status which train for careers and teaching in the arts and music, and their entry qualifications differ from institution to institution unlike the rest of the higher education system.

In the primary, lower and upper secondary stages described above there are parallel Sonderschulen (Special Schools) for children with physical, mental or emotional characteristics that make them unable to experience their due education in an ordinary school. Provision may be in special classes, special day or boarding schools and is on a larger scale than in many other countries in the European Community, for example at the first stage of secondary education about 5.5 per cent of pupils are provided for in this way.

III The Dual System

The traditional (and basic) system of vocational education and training in the Federal Republic of Germany is known as the Dual System. Under this system a young person on a training contract or apprenticeship receives appropriate vocational training in the firm with which the contract is made and also, by law, has to attend a vocational school for one day a week where an appropriate vocational education is provided. This system is in essence well established and is generally highly regarded. Maintaining co-ordination in the system is not easy.

The constitution of the FRG guarantees the control of education, and this is held to include vocational education, to the Länder. Vocational training and vocational guidance on the other hand are the responsibility of the Bund.

REGISTRATION OF BUSINESSES

All business activities (individuals or firms) must register with the local Chamber (Kammer) and pay the appropriate fees to the Chamber. The Chambers are established under public law, are non-profit making, have compulsory membership and achieve high participation by members in electing and participating in the collective affairs in the main Council and its committees. They provide a wide range of services and advice to their members, some providing stock exchanges and export guarantees. They also provide a mechanism for co-ordinating opinion on public issues of economic affairs, economic development, trading law, tax and education and feeding this co-ordinated opinion to Federal and Land authorities. The Chambers have a regional basis. There are also voluntary organisations that have an industry or sector basis.

Most firms register with the local Industrie- und Handelskammer (Chamber of Industry and Commerce) but firms carrying out activities within the defined list of 125 'Handwerk' trades may register with the local Handwerkskammer (Chamber of Crafts). Most firms in 'Handwerk' are small. They are the butchers, the bakers, the cabinet makers, the jobbing builders, the hairdressers and so on. Frequently, when they grow large, or diversify, they transfer their registration to Industrie- und Handelskammer. [6]

It should be added that there are also Chambers of Agriculture (Landwirtsschaftkammer) and separate registration systems for the so-called free or liberal professions (doctors, solicitors, architects, etc.)

LEGAL BASIS OF TRAINING

Currently the detailed arrangements and legal authority for the Vocational Training side of the Dual System derive from two main Federal Laws :

a. Berufsbildungsgesetz - 1969 - (Vocational Education Act)

b. Berufsbildungsförderungsgesetz - 1981 - (Vocational Education Development Act)

The object of initial training is defined in the 1969 Act as follows :

> *"to provide through a systematic training programme a broadly conceived basic preparation for an occupation and the necessary technical abilities and knowledge to engage in a skilled form of occupational activity. Initial training shall also enable a trainee to acquire-the necessary occupational experience."*

Under the Berufsbildungsgesetz of 1969 the basic position is as follows :

a. All training contracts (apprenticeships) must be registered as being for one of the 460 or so occupations defined and established by the Bund.

b. The training contract must be registered with the Chamber with which the employer is registered (all businesses must be so registered) and supervised by that Chamber which will conduct the terminal examination and test for the award of skilled status.

c. The training and testing will be within and to curriculum and standards established in the Ausbildungsordnungen (Training Regulations) issued by the Bund.

d. All workers on training contracts are guaranteed day-release (or block-release) for the length of the contract (under Länder law,derived from KMK agreements,all workers under 18 - with or without training contracts - are required to attend Berufsschule on day-release).

e. All training must be supervised by appropriately qualified personnel. These may be appropriate higher education graduates but are usually qualified Meister (Master Craftsmen). The training may also be supervised by holders of the Pedagogical Aptitude Certificate.[7]

f. The length of training is laid down in the regulations but can be varied by agreement if, for example, the apprentice has undertaken appropriate full-time studies at a specialist school.

CURRICULUM

By long tradition the Ausbildungsordnungen are issued by the Bundesministerium für Wirtschaft - BMWi - (Federal Ministry for Economic Affairs) but in practice since the establishment of the BMBW and the BIBB in 1969 the detailing of these regulations has been carried out mainly by BIBB in consultation with BMBW. The BIBB has a large professional staff, based in Berlin, and also conducts basic research statistical monitoring and develops teaching and training materials and equipment.

The Länder co-operate to provide appropriate vocational education and through the KMK issue Rahmenlehrpläne, appropriate syllabuses in an outline form, thus providing a comparability of education between Länder. Most Länder have a process of further detailing this syllabus and providing advice and teaching materials to the Berufsschule. In 1972 KMK and the Bund agreed a process for the co-ordination of a simultaneous revision of the Ausbildungsordnungen and Rahmenlehrpläne. This is described in Section VIII of this report.

ADMINISTRATION

The supervision of programmes, as well as examining, administration and advisory functions, is carried out by the Industrie und Handelskammern and Handwerkskammern. The statutory regulations for the practical implementation of training are decided by a Chamber's occupational training committee. This consists of six employers' representatives and six teachers from vocational schools, though the latter have only an advisory function.

In 1981 the 69 Industrie und Handelskammern supervised 771,300 occupational-training contracts of 147,416 employers and 43 Handwerkskammern supervised 676,200 contracts with 232,000 employers in 1979.

At the end of training, trainees take a final examination administered by the Chambers except in certain Länder where for agriculture they are administered by the Ministry of Food and Agriculture. The examination is both written and oral and for technical occupationsincludes test workpieces or samples of work made under supervision. A pass must be achieved in all areas and the exam may be repeated twice. There is also at least one intermediate examination. The examination board must have at least three members. Employers' associations and trade unions are represented in equal numbers and there must also be at least one vocational school teacher on it.

Although examinations are administered by local Chambers, they do not have to rely simply on their own expertise. Multiple-choice examination papers based on the training regulations and of a high standard of professionalism are usually drawn from central sources such as PAL in Stuttgart (for technical subjects) or ZPA in Köln (for business subjects).

The responsible Chambers determine whether an employer is qualified according to the regulations in the 1969 Berufsbildungsgesetz, to give training. These cover posts available, equipment, the number of trainees and the training personnel.

Trainees receive a salary according to trade union agreements which increases with time. In business occupations, on-the-job training where the trainee is integrated into the operation predominates. The craft trades and technical occupations make much use of training workshops for basic training before trainees are put on to actual work. Small and specialised businesses often combine in setting up workshops to carry out the full occupational training which their own individual firms cannot provide. Such centres are usually called überbetriebliche Ausbildungsstätten (Group Off-the-Job Training Centres), and may be run by local Handwerkskammern.

STATUS

Not all of the 460 or so trades defined in Federal regulations would be regarded in England as 'skilled'. They are not all of the same level of difficulty or achievement. They lead to the status of Facharbeiter or Geselle, words sometimes used as synonyms.

The word Facharbeiter (associated with Industrie- und Handelskammer trades) is more literally translated as specialist worker, rather than skilled worker. The word Geselle (associated with Handwerk trades) is more literally translated as Associate rather than journeyman or skilled worker.

All the above implies a high level of general social commitment to and respect for training. The monetary and social status of the Facharbeiter in FRG is high, and this is often seen within FRG as well as the UK as a key to the success of the West German economy. It should be added that the further status of Meister (Craftsman)[8] may also be regarded as crucial to the status of skilled worker. This higher status is achieved by further study after experience as a craftsman, and loans are available from the Bundesanstalt für Arbeit - BFA - (Federal Labour Office) to support these studies. In law one must be a Meister to register and practise the 125 Handwerk trades, to be an employer, to take on or supervise apprentices. Many large firms also make this a normal qualification for supervision in work places. Furthermore skilled status gives access to further training for the qualification of Techniker (Technician), and it also gives access to other forms of further training described in Section V of this paper. [9]

POLITICAL ASPECTS

The Industrie- und Handelskammern are organised into regional, Länder and Federal level organisations for the purpose of influencing matters of interest to them. This also applies to the Handwerkskammern. This provides a regional basis of influence. Organisations in Industrie may voluntarily join both *'industrial'* organisations for *'sector interests'* and employers organisations for collective bargaining. Local, regional and Federal level organisations exist. Meisters in the Handwerk trades may join trade specific Innungen (Guilds); again, local, regional and Federal level organisations exist.

At the Federal level, the Kuratorium der Deutschen Wirtschaft für Berufsbildung (Kuratorium of German Industry for Training) has been established to co-ordinate opinion on training from the large number of Federal organisations that have come to exist.

The trade unions - TU - play a large part in the system. They are well-informed, well-staffed and have clear and coherent policies. The political system of the Federal Republic recognises *'the social partners'* of employers, employees and the state as having a corporate responsibility for the affairs of society. This is expressed at all levels. The board of management of the Bundesanstalt für Arbeit, for example, is composed of equal representation; local committees for the BFA are so composed; BIBB includes TU representation on its board of management; the Chambers of Industry have TU membership on the committees that oversee apprenticeship training and testing; TU membership on Länder committees; and so on. Pride in skill is maintained in a corporate way which maintains status differentials.

IV The Upper Secondary System

This stage of education is complex for four main reasons :

a. Each Land is free to make its own organisational arrangements, although there is KMK agreement on the basic types of course and certificate to be provided

b. A particular certificate of satisfactory completion of a type of school (course) usually gives a right of entry to other forms of education

c. There has been an attempt to break down barriers between general and vocational education and to open up more routes as implied in b. above.

d. Developments continue.

The tradition is for mono-technic single-level schools.[10] More recently, more than one type or level of course has been clustered into a single organisation. Or more than one technology put onto a single campus or organisation. The organisational and administrative patterns tend to link the 'schools' very closely to the inspectorate rather than to other disciplines on the same campus. To some extent the name of a type of school is used in much the same way as the course-description is used in the UK; so that where more than one type of course is offered the institution may be given a name, for example, of a famous engineer, but the course-types offered described in a full title.

VOCATIONAL SCHOOLS

By agreement between the Länder, the main types of vocational school are as follows :

a. Berufsschulen (ocational College - Part-Time)

These colleges are the oldest part, the heart of the vocational education system. They provide organised basic instruction in theory on a day- or block-release basis for those who hold an apprenticeship. They are the educational half of the Dual System. The system is highly regarded, often with great affection as being the basis of German craftsmanship and industry. The system is not without its critics and this criticism together with general social change has led to a large number of variations. The Berufsschulen provide part-time education for all under 18, for those over 18 who are apprenticed, and full-time education for pupils on a Berufsgrundbildungsjahr (See Section IX of this report). Currently

there are about 2,300 Berufsschulen providing for about 1,800,000 pupils.

b. Fachschulen (Advanced Vocational Colleges)

Fachschulen are continuation schools, admission to which depends on completion of an appropriate course of vocational training (normally in the 'Dual System') and usually a further period of practical work experience. They may also require a Mittlere Reife (from Realschule) or a Fachschulreife (from Berufsaufbauschule) for entry. They offer a variety of types of course of specialised training and encourage general education. They are oriented, in the broadest sense, to career-development towards supervision, quality control or general management. Courses are taken full-time (for at least one year) or on a correspondingly longer part-time basis. They lead, as appropriate to the trades, to examinations for Techniker (Technician) Land-organised, Betriebswirt (General Administrator) Land-organised, or Meister - Kammern-organised. For further details see Section V of this report. About 180,000 pupils are currently studying at Fachschulen. Most are over 22 years old.

c. Berufsfachschulen (Vocational Colleges - Full-time)

These schools provide at least one year's full-time vocationally oriented education. They provide general and trade related education for young people who are not yet ready to take an apprenticeship or seek work. Employers may make an agreement with the young person to reduce the length of their apprenticeship in regard to this training. The main function of these schools though, is to orient the young people to work and guide and prepare them for an apprenticeship. They are a growing part of the system. About 325,000 pupils are currently studying at Berufsfachschulen.

d. Berufsaufbauschulen (Continuation Vocational Schools)

Admission to many Fachschulen courses and many types of continuation education are governed by possesion of a 'Mittle Reife'. Pupils leaving the Hauptschule (over half the leavers) have no access to such a certificate except by attendance at the Berufsaufbauschulen either simultaneously or consecutively with the Berufsschulen. Some young people attend on a one-year full-time basis. The part-time courses are correspondingly longer. About 17,000 young people are currently undertaking such studies.

e. Fachoberschulen (Vocational Education Centres - Full-time)

Young people from Realschulen with a certificate of successful completion (or young people with its equivalent) may enter the Fachoberschule for a two-year full-time course. In the first year there is considerable emphasis on practical training in a trade, although students with a trade qualification may be exempt from this year. In the second year there is considerable emphasis on the

theoretical side and the terminal examination is a Fachhochschulreife, that is it gives the right of access to an appropriate course in a Fachhochschule. Students starting from a Hauptschule and successfully completing a Berufsfachschule may be awarded a Mittlere Reife which gives them right of access to the Fachoberschule. Currently about 120,000 people attend a Fachoberschule

We have already stated that names of institutions may not easily describe the courses taken in the institution. The titles given above are essentially for general types or levels of course, and local names may vary also by the use of the name of the trade to replace the general descriptions of 'Beruf' (Vocation) or 'Fach' (Specialised). Thus a 'Höhere Handelschule' is probably a 'Höhere Berufsfachschule' specialising in the commercial trades. Usually a visitor, using the above general descriptions, can clarify quickly what sort of work is going on in the institution. The more important regional variations are given below.

GENERAL EDUCATION AND 'MIXED-TYPE' SCHOOLS

In all Länder there has been pressure from a variety of sources to re-organise secondary education to open-up new routes in the system, to expand the higher status forms of provision and to raise the status of vocational education.

f Oberstufen (Higher General Education)

are the higher grades of the Gymnasien leading in Grades 11 to 13 to the Abitur examinations. They may in some places have been given a measure of organisational independence from the Gymnasien or Gesamtschulen and accept pupils from the Realschulen and Hauptschulen either direct or into special Aufbauformen (Development Classes). In these cases they are sometimes called Oberstufenschulen (Sixth Form Colleges). The courses lead either to a general Hochschulreife, allowing entry to any higher education course or a Fachhochschulreife in which the pupil is limited to an appropriate course in a Fachhochschule. About 500,000 pupils attend Oberstufen of various types.

g. Höhere Berufsfachschulen (Higher Vocational Colleges - Full-time)

These schools exist in some Länder and are older and more traditional forms of school that in essence serve a similar function to that of the Fachoberschule; that is they take young people from a 'Mittlere Reife' level and train them for entry to jobs or professions at a higher level. Their tradition is to recruit more from the Berufsfachschule than the Realsschule and to include little practical training. Thus after a successful completion of the Höhere Berufsfachschule the young people may still need practical experience before entering the Fachhochschule.

h. Fachgymnasien/Berufliche Gymnasien (Vocational Grammar Schools)

are Gymnasien with a strong vocational orientation and have been introduced in some Länder. The courses lead to a Fachhochschulreife.

i. Berufsoberschulen (Higher Vocational Education Schools)

introduced in some Länder, provide full-time courses for those who have completed vocational training in the Dual System and wish to acquire a Fachhochschulreife. They are similar in function to the second year of the Fachoberschulen.

j. Fachakademien (Specialist Academies)

are a form of Fachoberschulen existing in some Länder.

k. Berufskollegs (Vocational Colleges)

are a form of Fachoberschule in some Länder and have a brief to provide, in addition to full-time courses, an integrated training with industry leading to a Fachhochschulreife.

l. Oberstufenzentren (Tertiary Colleges)

have been introduced in Berlin and provide, in a single establishment, the Oberstufe, the Berufsschule, the Berufsfachschule and Fachoberschule.

---

m. Berufsakademien (Vocational Academies)

are really part of the Higher Education system but provide by day- and block-release with firms a form of training leading to a professional qualification, the equivalent of a Hochschulabschluss (Degree Equivalent Certificate).

---

n. Sonderberufsschule, Sonderberufsfachschule, etc.

are 'special' schools of the type described with provision for people with physical (or mental) handicaps. At this level much of the provision is by charitable organisation using funds from the public authorities.

V Continuing and Adult Education

GENERAL

The dominant provision of the Länder is through the Volkshochschulen (Adult Education Institutes) which provide a wide variety of leisure, cultural, general and vocational studies, mostly on a non-examination basis. The general school-leaving certificates may be studied for on a part-time evening basis so there are classes organised for Abendgymnasien (Evening Grammar School), Abendrealschule .. etc.

In addition to the Länder provision there is a rich variety of organisations active in the field, including the churches, political parties and trade unions.

VOCATIONAL

A variety of measures exist. The Bund could determine the syllabus and qualifications in a wide variety of fields but in practice leaves large areas open to the Länder or Kammern. The Industrie- und Handelskammern co-ordinate some of their work through the Deutscher Industrie- und Handelstag (DIHT). Courses leading to the qualifications may be part-time or full-time, organised by the Länder or the Kammern or elsewhere. The Fachschulen (see Section IV of this report) are particularly important in this area.[11] Some examples of courses are as follows :

a. Meister (Master Craftsman)

taken after at least two-years trade experience following qualification as a craftsman. Kammer examined. Most students are on full-time courses in a variety of institutions although entry to the examinations does not require any tuition at all. Syllabus includes specialist theory, skills, trading law, accounts, training of apprentices (etc) to Bund-defined regulations.

b. Industrie-Meister (Industry Master)

similar to Meister but with a different syllabus of law and accounts suitable for a supervisor in a large firm. Syllabus defined by the DIHT, examined by local chambers.

c. Betriebswirt (General Administrator)

A Land-defined and examined syllabus, usually taught in a Fachschule. Appropriate to non-technical trades.

d. Techniker (Technician)

A Land-defined and examined syllabus, usually taught in a Fachschule. Appropriate to technical trades.

e. Fachwirt (Business Manager)

A DIHT-defined syllabus, examined by local Kammern; providing a general administration course, oriented to a particular industry. Variously provided courses.

f. Fachkaufmann (Specialist Administrator)

A DIHT-defined syllabus examined by local Kammern, providing a course for a function in administration (eg. Marketing, Costing, Personnel). Variously provided courses.

g. Sekretärin (Secretary)

Defined and examined by local Kammern.

etc.

etc.

Short, non-examined, vocational courses exist in vast profusion. Many are provided by the Innungen (Guilds) and the Trade Associations, both of which play a large part in the life of the economy in the FRG.

This type of education is marked off from the bulk of the rest of education in that there are fees, often quite large, for this sort of work while for most of the rest there are none. For full-time study in this area there are loans available from the BFA. For full-time study after the minimum leaving age in nearly all the schools listed in Section IV, as well as for Higher Education, there are grants which are means-tested on parental income.

VI The Teachers

LÄNDER (GENERAL EDUCATION)

a. Teachers for Gymnasien type work or Realschule type work must complete eight semesters (for Hauptschule 6) in at least two subjects at University before taking their first state examinations. Then follows a period of two years practical teaching while attached for further pedagogic instruction to a 'seminar'. At the end of two years they take their second state examinations for qualified status.

LÄNDER (VOCATIONAL EDUCATION)

b. General Education Teachers in Berufsschule or in any of the mixed type of schools must have qualifications as in a. above. Preference is given to those with practical experience in industry.

c. Theory Teachers in addition to teachers trained as in a. or b. above provision is made for Fachschule - qualified people to undertake further training in at least two subjects and pedagogic disciplines.

d. Practical Teachers are usually of Meister status, which of course includes a pedagogic element. There exists in KMK an agreement that all Länder will attempt to provide a defined further training (shorter than for the theory teachers). In practice long experience, together with staffing pressures, means that this has frequently been set aside for the future.

INDUSTRY

Large training firms frequently establish their own Ausbildungsstätten (Off-the-job Training Centres) where the mixture of staff includes graduates, Fachschule-qualified and Meisters. Small firms frequently co-operate, sometimes through the Kammern, to provide Überbetriebliche Ausbildungszentren (Group Off-the-job Training Centres).

The law requires that all apprentices must be supervised by appropriately qualified staff. This usually means a Meister (Master Craftsman), or someone holding an appropriate higher qualification. Criticism of abuse of the system, where the direct supervision was by persons of lower qualification with the Meister frequently absent or 'on other duties' led in 1972 to the introduction of the Pedagogic Aptitude Certificate as a required qualification for direct supervision. This is

the pedagogic element of the Meister syllabus abstracted, requiring the same basic qualification and work experience, but taken separately. This requirement is now being enforced.

VII Examinations

Most of the outlines of the main examinations and qualifications has necessarily been given in Sections III, IV and V of this paper. The following general points should be borne in mind :

a. In the FRG system, successful completion of one stage or type of education leads to a right of access to another stage or type.

b. The same examinations may be described either with the suffix 'abschluss' indicating it is the leaving certificate of the class or type of school; or with the suffix 'reife' indicating it is a right of entry to the school represented in the stem word Thus a Fachoberschulabschluss is a Fachhochschulreife.

c. Schools and colleges of all types are responsible for setting and marking their own examinations (to Länder-set syllabuses).

d. For the defined trades it is the Kammern that are responsible for setting and marking their own examinations (to Bund-determined regulations).

e. Systems of moderation and standardisation are less of a concern in the FRG than they are in the UK.

VIII The Curriculum

A central set of problems in any educational structure surrounds the process of establishing and implementing a curriculum. This is particularly difficult in the case of the Federal Republic in the vocational field because of the traditions of the Dual System. There is throughout the system a desire to achieve a high level of co-ordination between the two sides of the Dual System, the first part of which is to achieve high compatibility between the Ausbildungsordnungen - AO - (Training Regulations) administered in the firms, and the Rahmenlehrpläne - RP - (Framework Curricula) as administered in the Berufsschule. To achieve this, a joint Bund-Länder committee has been established since 1972. This is known as the Koordinierungsausschuß (Co-ordinating Committee) of the Standing Conference (KMK). It includes representatives of Federal Ministries of Employment and Social Affairs, Economics and Finance, Education and Science, and another ministry responsible for the area of work to which the AO and RLP refer (if necessary), as well as one representative of each Länder ministry or senate.

The tasks of the Koordinierungsausschuß are as follows :

- To agree basic principles for harmonisation of AO and RLP.
- To decide in which priority order AO and RLP need updating and which committee should do it.
- To ensure proper feedback to the relevant initiating centre and bodies.
- To carry out a final reconciliation between AO and RLP before recommending them for issue by the relevant bodies (ie. the Chambers and Education Ministries)

A key resolution of the Koordinierungsausschuß of 1974 established a model process for any one occupation. This is described in (translated) facsimile diagrams of the original in Appendix D to this paper. The work is heroic in the complexity of process and the time necessary for agreement. In some trades some rudimentary elements of time-sequencing have been established in the regulations and even built into the training contracts of apprentices.

Frequent criticisms are levied nonetheless by both halves of the Dual System at the other for non - cooperation. Yet at a trade-specific and local level regular informal contact is also claimed to exist.

The outline curricula (RL) and the outline training regulations (AO) are not specific enough to be called teaching syllabuses. All Länder have their own process of detailing the RL into something closer to a teaching syllabus by Land Curriculum Institutes with full-time professionals, or by groups of teachers seconded part-time for the process. They are then issued to all teachers. The larger training firms detail the AO into large fat handbooks or manuals. Some trade associations (eg. DEHOGA for the Hotel trades) do this as well. Meetings between these teams are infrequent, casual or non-existent, as are meetings between the BIBB teams and the local teams.

In addition, the co-ordination process has been applied to the development of curricula for the Berufsgrundbildungsjahr, although in the process it proved impossible to reduce fully the options to the target numbers. Compromise was achieved by allowing branches and options.

IX The problems of the transition from school to working life

All West European countries have faced problems deriving from the rise in the number of young people entering the labour market between 1970 and 1982, at a time when the economy was hesitating in its overall provision of employment and simultaneously demanding more of those it employed. The Federal Republic of Germany has responded with five specific sets of measures.

ARBEITSLEHRE

Arbeitslehre,[12] or learning about the world of work, has been developed as a specific component in the curriculum of the Hauptschulen. By re-designing and re-grouping certain subjects, and by curriculum development and re-orientation of the teachers the authorities in the FRG, and in particular the KMK, have been trying to better prepare young people for work.[13]

VOCATIONAL GUIDANCE

The Bundesanstalt für Arbeit has the sole legal responsibility for giving vocational counselling in the Federal Republic. There has been difficulty therefore in integrating this activity to the schools but, as a result of agreement between the KMK and the BFA, vocational guidance has been improved, strengthened, brought more firmly into the schools and linked closely to the Arbeitslehre programme. At the same time multi-media open-access Vocational Information Centres have been established for pupils and parents alike.[14]

BERUFSVORBEREITUNGSJAHR - BVJ

The BVJ, or Vocational Orientation Year, has been developed because, despite the above measures, many young people leave school unprepared for work or apprenticeship. This is particularly true of young recent immigrants from ruralbackgrounds where little German is spoken. The Vocational Orientation Year, as well as other specific measures for vocational and social integration, are to provide for such young people. Courses are one-year full-time, usually cover two or more very different trade areas, and are frequently provided by charitable organisations using state funds.15

BERUFSGRUNDBILDUNGSJAHR - BGJ

The BGJ is different from the BVJ. It is a basic foundation year designed to be a first year training appropriate for all of a group of the 460 or so defined trades. The design

intention is to provide both a better general education and vocational grounding for the young by seeing the commonality of certain basic skills and knowledge. It is to prepare, or lay foundations, for job or work change inevitable in a changing technology. It is regarded with suspicion by employers used to trade-specific training. Although theoretically available in full and part-time form (in co-operation with employers) only the full-time form has expanded, but largely as a 'holding pool' for those unable to obtain apprenticeships. This has served to raise the levels of suspicion in which the scheme is held.[16]

APPRENTICESHIPS

The biggest programme of all has in a way been the simplest. As a result of big campaigns from the Bund and the Kuratorium the number of apprenticeships offered by employers has increased faster than the age group coming forward over the last eight years. This has been partly an aspect of social policy and partly a conscious stock-piling of skilled labour for the period after 1986 when the number of young people coming forward will fall very low.

X Problems of the eighties

Few new problems are being identified for the eighties, but the problems of the seventies continue in a new climate. One main element is the way in which the governments in FRG have responded to the 'world recession'. Traditional financial caution, and a cessation (or recession) of growth of government spending are the order of the day, although all parties tend to favour (realistic) vocational education and training.

The system expanded the number of apprenticeships being offered between 1970 and 1982 rather faster than the number of children leaving school expanded. As the number of young people leaving school declines the system can now contract with the recession without political difficulty. The problem remains though, can the economy absorb those it is now training?

Politically a bigger problem may be graduate unemployment. The traditions of registration for higher education as a right of those properly certificated, in a tradition of long but indefinite periods of study, has created a huge pool of potential graduates with high aspirations. A hesitating economy cannot easily absorb them.

The pool of graduate-potential has been brought about in part by a high social evaluation of general education compared to that of vocational education. Can the FRG lessen the pool by encouraging the Fachoberschulen and Apprenticeship routes by raising their status?

Can a contracting or hesitating economy continue to provide generously for the recently-arrived children of its migrant workers to lead them into an easy encorporation into a trained and disciplined labour force? What alternatives are there?

Career-development training for supervisory and middle-management has been based in the FRG on a high level of respect for training as such , by low fees, and by grants for full-time development training. As the grants are removed, and the loans trimmed, will the economy find the middle management it wants? What are the responses of the economy likely to be?

The pace of technological change will accelerate. The traditional training is craft or trade-specific. Change in the regulations is slow and needs heroic effort. Will the labour force prove sufficiently trained, disciplined and studied to prove flexible? What can be done to improve flexibility in individuals and in the system?

Appendix A

1. The status of Berlin is one of great ambiguity and discussion for constitutional lawyers. It is acknowledged to be one of the Länder of the Federal Republic, and the capital of Germany, by the basic constitutional law of the Federal Republic of 1949. However, for certain purposes it is still governed by the agreement between the four allies. In practice what this means is that any Federal law that does not cover international relations, armed forces, or security may be ratified by the Berlin Senate as applying to Berlin-West. Deputies to the Federal Parliament are nominated by the Senate and not elected direct.

2. Formerly called Bundesinstitut für Berufsbildungsforschung (BBF).

3. See also Appendix G.

4. A wall-chart giving the systems of each of the Länder is available from:
   Bundesministerium für Bildung und Wissenschaft (BMBW),
   Postfach 20-01-08, 5300 Bonn.

5. For reporting and comparative statistical purposes there is an EEC - OECD agreement to describe compulsory secondary education as first stage or lower secondary education. Upper secondary education for these purposes includes vocational education that is not "higher" and which is most usually taken consecutively (even if part-time) following lower secondary education. Thus most of what in England is usually called further education is, in the Federal Republic of Germany and throughout most of Europe, called upper or second-stage secondary.

   In the FRG the term Weiterbildung (Further Education) is reserved for continuing or adult education (see also Section V of this report). Care should be taken in using or translating these terms.

6. For further details see:
   RUSSELL, RUSS *The organisation of craft activities in the Federal Republic of Germany* Information Paper No. 1725 Coombe Lodge Publications, Blagdon.

7. See also:
   FLOWER, F. and RUSSELL, R. *The Industrial Tutor* No.4 Studies in Vocational Education and Training in the FRG Coombe Lodge Publications, Blagdon.

8. As for Note 7.

9. See also:
   RUSSELL, R. and PARKES, D.L. *Career Development Education in the FRG* No.9 Studies in Vocational Education and Training in the FRG, Coombe Lodge Publications, Blagdon.

10. The term 'Schule' is used for institutions that in England would be called 'colleges'. The term student is by convention reserved for university students and all others are 'Schüler' (or pupils).

11. As for Note 9.

12. See also:
RUSSELL, R. *Learning about the world of work in the FRG* No. 7 Studies in Vocational Education and Training in the FRG Coombe Lodge Publications, Blagdon.

13. Young worker is a term usually reserved for a 16-18 year old who is in work but has no apprenticeship contract or training.

14. See also:
CLARKE D. and RUSSELL R. *Vocational Counselling and Guidance in the FRG* No.2 Studies in Vocational Education and Training in the FRG, Coombe Lodge Publications, Blagdon.

15. See also:
RUSSELL, D. and PARKES, D.L. *Measures to deal with Youth Unemployment in the FRG* No.1 Studies in Vocational Education and Training in the FRG, Coombe Lodge Publications, Blagdon.

16. See also:
RUSSELL, R. and NEALE, M. *Experiments with the first year of apprenticeships in the FRG* No. 3 Studies in Vocational Education and Training in the FRG, Coombe Lodge Publications, Blagdon.

17. See also:
Russell, R. "The Organisation of Craft Activities in the Federal Republic of Germany" *Information Paper No. 1725* 1982 Coombe Lodge Publications, Blagdon.

Appendix B

STRUCTURE OF THE KMK

Plenum:

Consists of the Land Education Ministers (or Senators in the case of Bremen, Hamburg, Berlin). The plenum makes resolutions on all matters pertaining to the KMK in so far as the matter does not lie within the competence of some other body. Resolutions requiring the assent of other Land bodies only become binding when each state has accepted them. Each Land has a vote. Resolutions require a unanimous vote.

Conference of Heads of Office (Amtschefkonferenz):

Its members are the Staatssekretäre (Länder) (Deputy Ministers) or Senatsdirektoren (City States). Deals with more routine matters of co-ordination and prepares the ground for ministerial decisions.

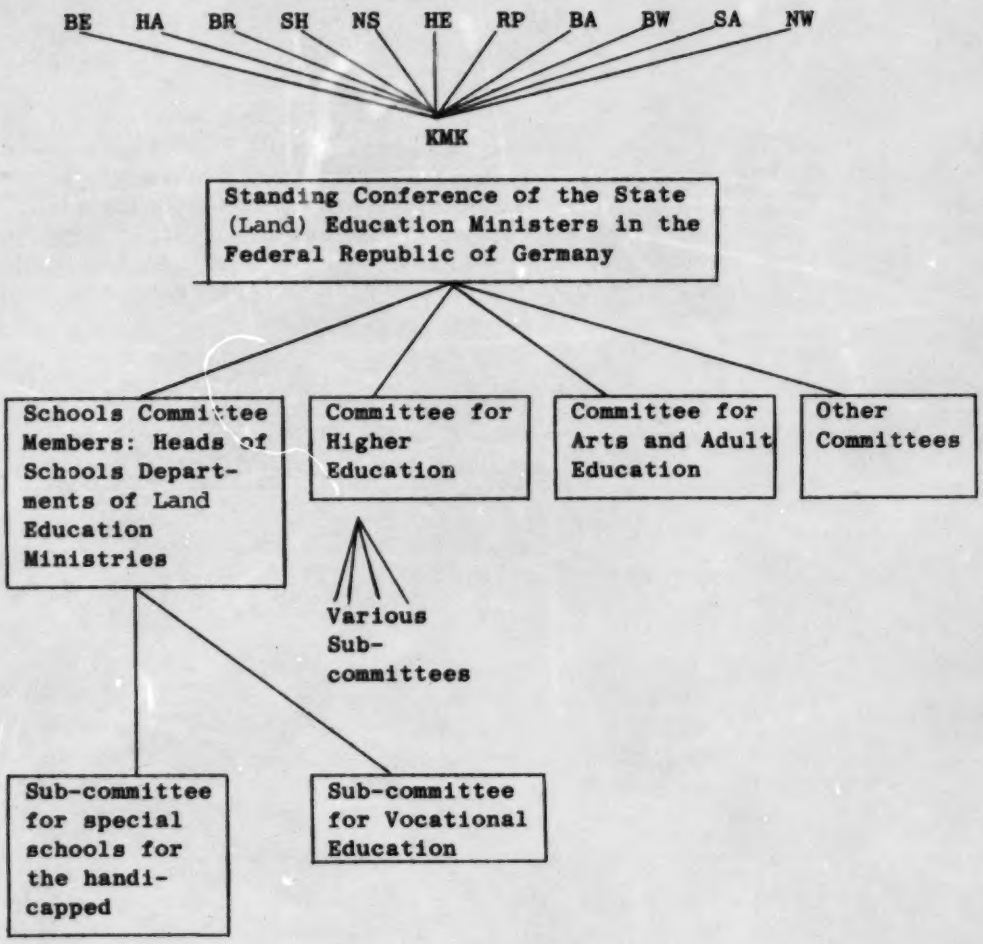
School Committee (Schulausschuß):

One of the various KMK sub-committees handling specialist areas, each with a Land representative. The committee chairman is elected by plenum on the committee's recommendation and convenes as the need arises. Experts can be co-opted onto the committee from outside organisation. Special sub-committees can be set up for important priority areas. Voting is on a simple majority basis, one Land one vote. Unanimous recommendations have to be submitted to plenum and/or to another committee or Land government if committee is required to do so within one month of making the recommendation; otherwise the recommendation becomes a valid resolution of the KMK.

The Sub-committee on Vocational Education (Unterausschuß für berufliche Bildung):

Is one sub-committee. Its task is to set up and provide guidelines for the individual curriculum committees.

APPENDIX B (Continued)


BE HA BR SH NS HE RP BA BW SA NW
KMK
Standing Conference of the State (Land) Education Ministers in the Federal Republic of Germany
Schools Committee Members: Heads of Schools Departments of Land Education Ministries
Committee for Higher Education
Committee for Arts and Adult Education
Other Committees
Various Sub-committees
Sub-committee for special schools for the handicapped
Sub-committee for Vocational Education

Key

BE	Berlin
HA	Hamburg
BR	Bremen
SH	Schleswig Holstein
NS	Niedersachsen
HE	Hessen
RP	Rheinland-Pfalz
BA	Bayern
BW	Baden-Württemberg
SA	Saarland
NW	Nordrhein-Westfalen

Appendix C

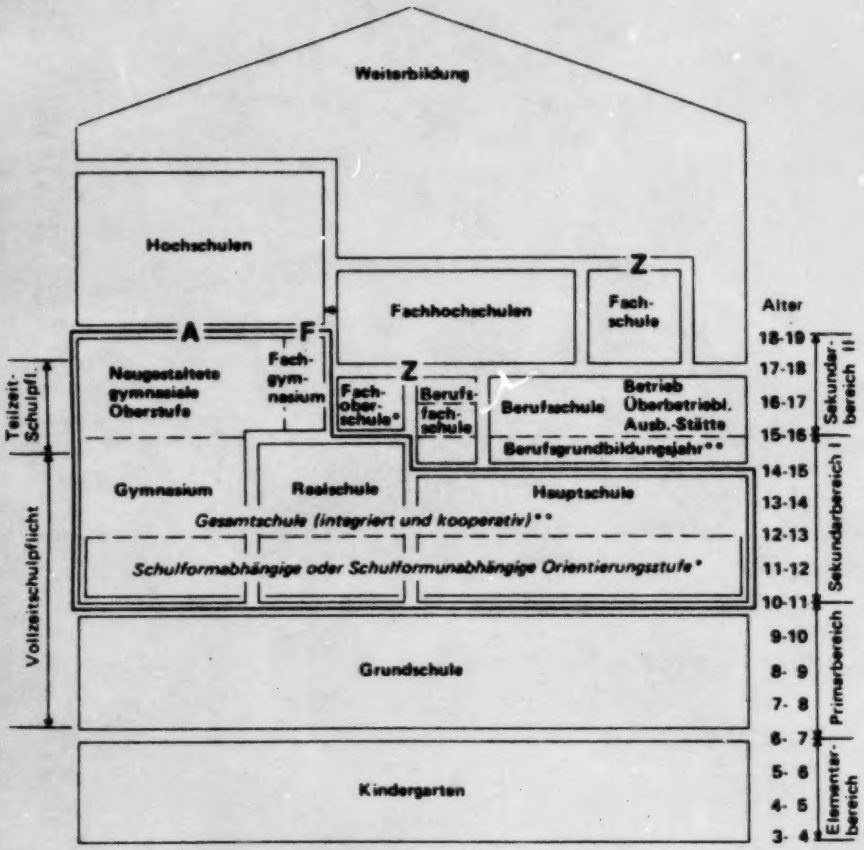


Abbildung 1
Überblick über die Struktur des Bildungswesens in der Bundesrepublik Deutschland

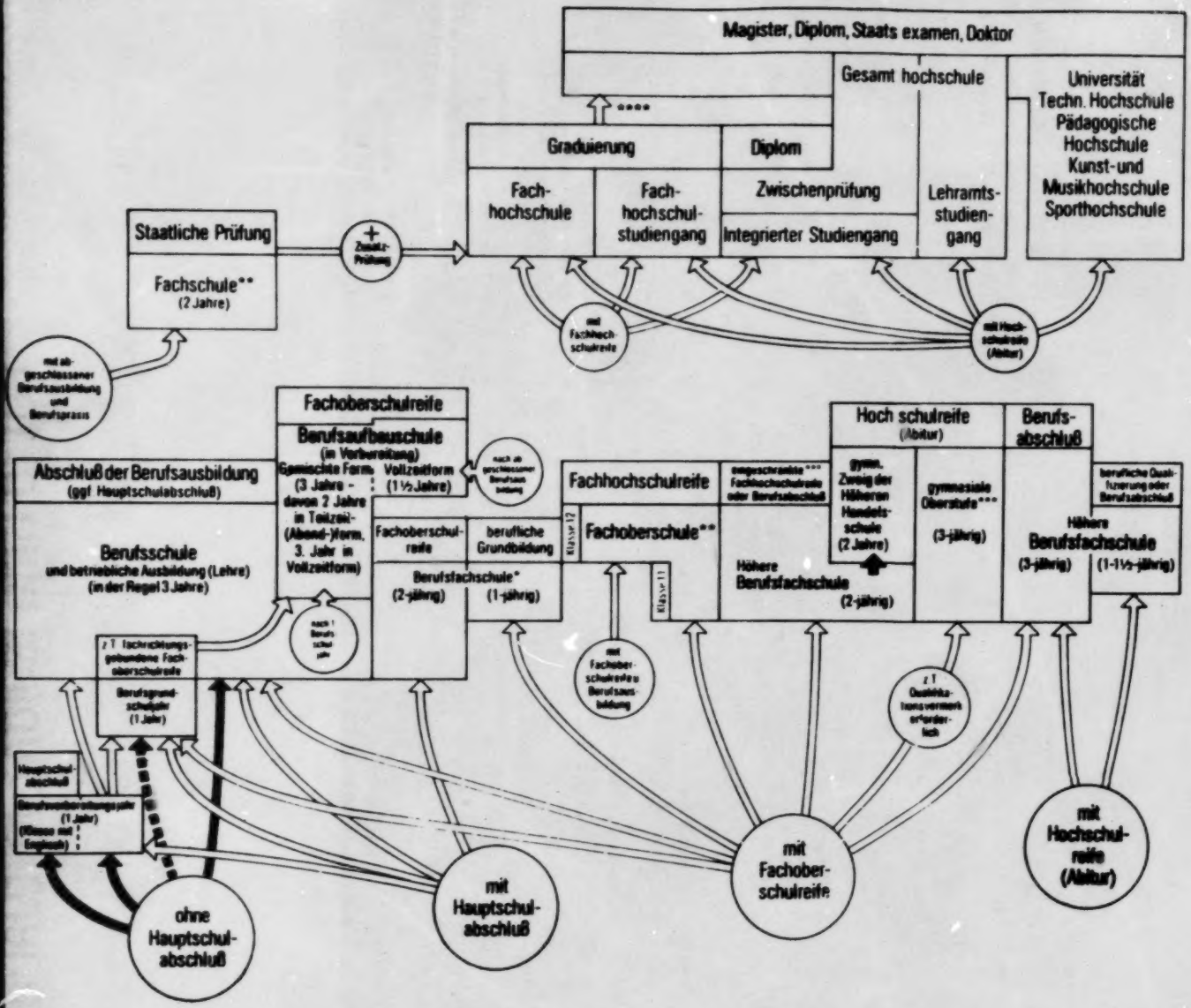
A = allgemeine Hochschulreife
F = fachgebundene Hochschulreife
Z = Fachhochschulreife

* nicht in allen Bundesländern; zum Teil Schulversuche

** für einen Teil der Schüler bzw. der Auszubildenden; zum Teil Schulversuche

Quelle: Der Bundesminister für Bildung und Wissenschaft

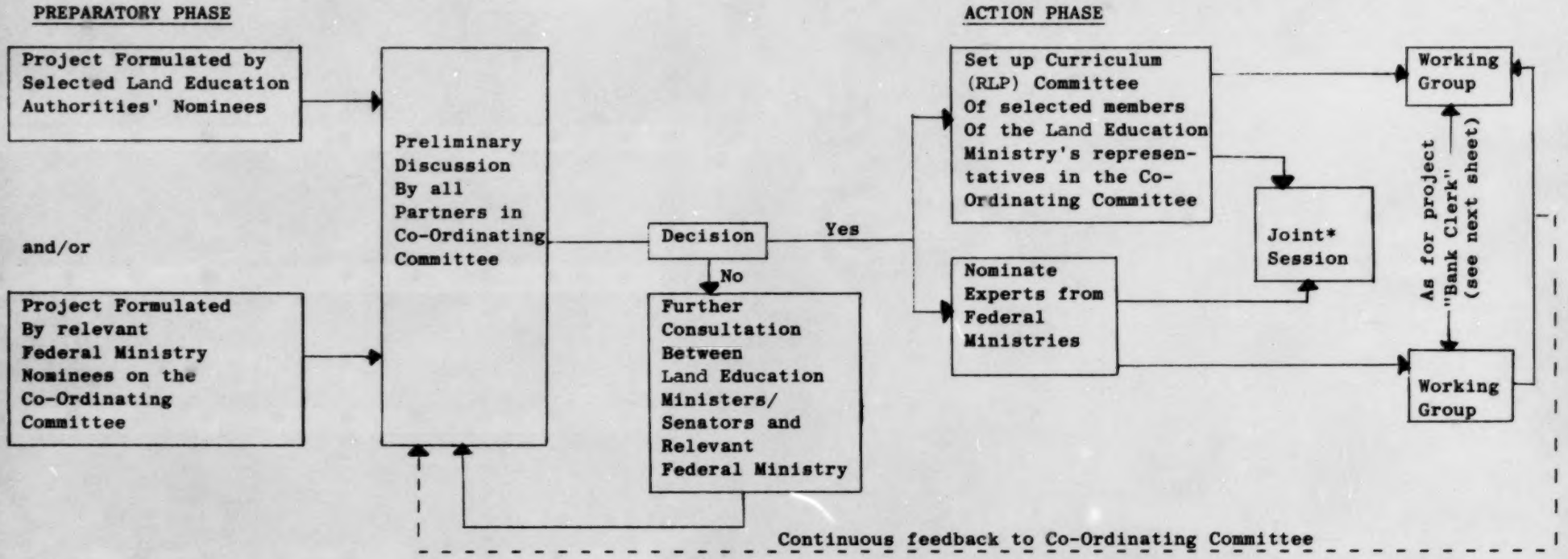
General or typical plan of the educational systems of the Länder of the Federal Republic of Germany



The Vocational Education System of Nordrhein-Westfalen

Appendix D

The Process of Harmonisation of Training Regulations (Ausbildungsordungen) and Framework Curricula (Rahmenlehrpläne)
Bund und Länder Decision of 30/5/72 and Co-Ordinating Committee Resolution of 8/8/74.


PREPARATORY PHASE
ACTION PHASE
Project Formulated by Selected Land Education Authorities' Nominees
and/or
Project Formulated By relevant Federal Ministry Nominees on the Co-Ordinating Committee
Preliminary Discussion By all Partners in Co-Ordinating Committee
Decision
Yes
No
Further Consultation Between Land Education Ministers/ Senators and Relevant Federal Ministry
Set up Curriculum (RLP) Committee Of selected members Of the Land Education Ministry's representatives in the Co-Ordinating Committee
Nominate Experts from Federal Ministries
Joint* Session
Working Group
Working Group
As for project "Bank Clerk" (see next sheet)
Continuous feedback to Co-Ordinating Committee

*Joint Meeting of Experts:
(Gemeinsame Sitzungen)
Ensure proper harmonisation of AO and RLP. Research carried out by BIBB provides a basis for discussion. The Länder are represented by their own experts and the Federal Ministry can nominate experts from BIBB to represent them. During separate working party meetings on AO and RLP, each side can send an observer to advise the other.

Contact Meetings
(Kontaktgespräche) between Bund and Länder representatives take place between sittings to ease the process of harmonisation.

APPENDIX D (Continued)

ACTION PHASE (Expansion of previous page)

Project (e.g. Bank Clerk)
Approved by the Co-Ordinating Committee

LAND SIDE (Standing Conference of the 11 Länder Education Ministry KMK)

FEDERAL SIDE

1. Stage:

Observers

KMK Sub-committee for framework curriculum (RLP)

Separate Sessions to work out:

Curricula
e.g.
- Economics
- Business
- Administration

Training Regs. (AO)

Experts from national (Federal) bodies

including:

(about 15 centres of 10-20 teachers and other experts)

(SH) 1 leading Land
(HA) 4 other Länder
(BR) (direct involvement)
(NS) remaining Länder
(BE) informed

Exchange of minutes

KMK Secretariat

including:

Federal Ministry of Economic Affairs (BMWi)
Federal Ministry of Education & Science (BMBW) (about 15 participants)
Federal Institute for Vocational Training (BIBB)
Employers' Associations (AG)
Trades Unions (AN)

2. Stage:

KMK Committee and experts from Federal bodies together agree what shall be taught, when and where.

3. Stage:

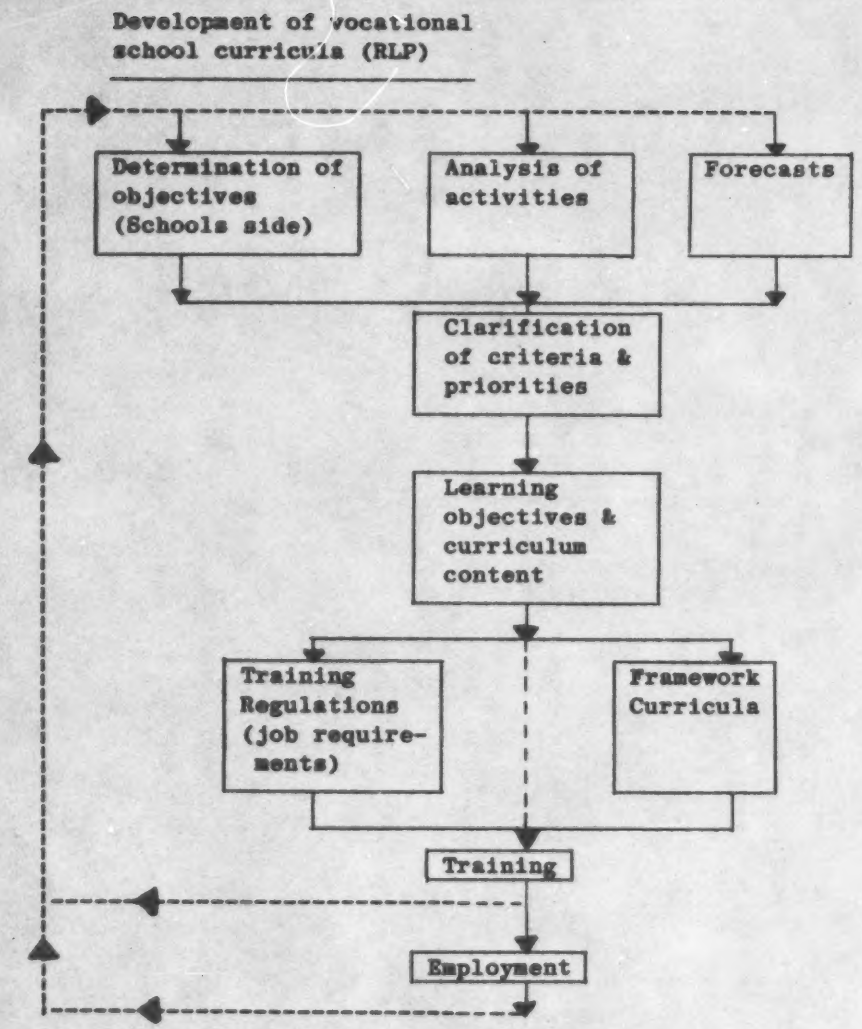
Issue of agreed RLP framework Curricula (harmonised with AO) for all Länder by each Land Kultus Minister

Issue of Federal Training Regulations (AO) (harmonised with RLP) by the approved Ministry

APPENDIX D (Continued)

EXPANSION OF PARTS OF ACTION PHASE

LAND SIDE



FEDERAL SIDE

Development of basic material for the training regulations (AO) for

- Consultation with leading industrial organisations and trades unions
- Visits to firms and typical training centres for various
- Case studies
- Collection of data, publication of reports
- Design and circulation of questionnaires (including pilot tests)
- Evaluation
- Design of draft training programmes (by didactically trained specialists)
- Consultation in specialist committee

Appendix E

Abendgymnasium : Evening Gymnasium or grammar school

Abitur/Reife prüfung : The leaving certificate (or examination) of the Gymnasium

Allgemeine Hochschulreife : An Abitur certificate granting entitlement to enter or study any discipline at University

Arbeitslehre : Learning about the world of work

Aufbauformen : Development classes

Ausbildungsordnungen : Training regulations issued by Federal Ministry of Economic Affairs

Ausbildungsstätten/Überbetriebliche Ausbildungsstätten (Group) Off-the-Job Training Centres

Ausschuß : Committee

Beruf : Vocation

Berufliches Gymnasium : Vocational grammar school

Berufsakademien : Vocational academies

Berufsaufbauschulen : Continuation vocational schools

Berufsbildungsförderungsgesetz : Vocational Education Development Act

Berufsbildungsgesetz : Vocational Training Act (1969)

Berufsfachschulen : Vocational Colleges (full-time)

Berufsgrundbildungsjahr/Berufsgrundschuljahr : Basic Vocational training year. This is available in full-time form or co-operative form with industry. In some Länder the full-time form is called the Berufsgrundschuljahr.

Berufskollegs : Vocational colleges

Berufsoberschulen : Higher vocational education schools

Berufsschulen : Vocational colleges - part-time

Berufsvorbereitungsjahr : Vocational orientation year

Betriebswirt : General administrator

Bildungsgesamtplan : General plan for education

Bund-Länder-Kommission für Bildungsplanung und Forschungsförderung : Federal and Länder Commission for Educational Planning and the Advancement of Research

Bundesanstalt für Arbeit : Federal Employment Institute

Bundesinstitut für Berufsbildung (BIBB) : Federal Institute for Vocational Education

Bundesministerium für Bildung und Wissenschaft (BMBW) : Federal Ministry of Education and Science

Bundesministerium für Wirtschaft : Federal Ministry for Economic Affairs

Fach- : Specialised

Fachakademien : Specialist academies

Facharbeiter : Skilled worker, specialist worker

Fachgebundene Hochschulreife : Entry certificate for specific subjects at higher education institutions

Fachgymnasien/Berufliche Gymnasien : Vocational grammar schools

Fachhochschulen : Polytechnics

Fachhochschulreife : Leaving certificate of the Fachoberschule

Fachkaufmann : Specialist administrator

Fachoberschulen : Full-time vocational colleges. In some Länder called Berufskollegs

Fachschulen : Advanced technical colleges

Fachwirt : Business Manager

Fernuniversität : Distance university

Gesamthochschule(n) : Comprehensive university(ies)

Gesamtschulen : Comprehensive schools

Geselle : Skilled worker, journeyman

Grundgesetz : Constitution, Basic Law

Grundschule : Basic or primary school

Gymnasium : Grammar school

Handwerkskammer : Chamber of Crafts

Hauptschulen : Secondary modern (or main) schools

Hauptschulabschluss : Qualifying leaving certificate from the Hauptschule

Hochschulabschluss : Degree Equivalent Certificate

Hochschulrahmengesetz : Higher Education Framework Act

Höhere Berufsfachschulen : Higher full-time specialised vocational schools

Industrie- und Handelskammer : Chamber of Industry and Commerce

Industrie-Meister : Industry Master

Ingenieur Schulen : Engineering Schools

Innung (en) : Guild(s)

Kammer : Chamber

Koordinierungsausschuß : Co-ordinating committee

Kreis : District

Kultusministerium : Ministry of Education

Kultusministerkonferenz : Conference of Education Ministers (of the Länder)

Kunsthochschulen : Art Colleges

Kuratorium der Deutschen Wirtschaft für Berufsbildung : Kuratorium of German Industry for Training

Land/Länder : State/States that comprise the Federal Republic of Germany

Landwirtschaftskammer : Chambers of Agriculture

Meister : Master (Master Craftsman)

Mittlere Reife : Intermediate Certificate

Musikhochschulen : Music Colleges

Oberstufe/Neugestaltete Gymnasiale Oberstufe : Higher General Education Centres (Reorganised upper years of the Gymnasium or Gesamtschule)

Oberstufenzentren : Tertiary Colleges

Pädagogische Hochschulen : Teacher Training Colleges

Rahmenlehrpläne : Outline curricula issued by KMK

Realschulen : Technical grammar schools

Regierungsbezirk : Region

Sekretarien : Secretary

Sonderschulen : Special schools

Stadt : City

Ständige Konferenz der Kultusminister der Länder in der Bundesrepublik Deutschland (Kultusministerkonferenz - KMK) : Standing Conference of the Cultural and Educational Ministers of the Länder of the Federal Republic of Germany

Techniker : Technician

Überbetriebliche Ausbildungsstätten : Group Off-the-Job Training Centres

Volkshochschulen : Adult Education Institutes

Appendix F: FURTHER READING AND REFERENCES

INTRODUCTION TO THE EDUCATION SYSTEM IN THE FRG

The following items are descriptive accounts of the educational system in general.

1 British Council. *Federal Republic of Germany.* (Education Profile), British Council, 1981.

2 Fuhr, Christoph. *Education and Teaching in the Federal Republic of Germany.* Munich, Carl Hanser Verlag, Inter Nationes, 1979. ISBN: 3-446-12810-7.

3 Littmann, Ulrich. *An Introduction to the Confusion of German Education.* ISBN: 3-871972-045-2.
Available from - DADD, Kennedyallee 50, D53, Bonn-Bad Godesberg, Federal Republic of Germany.

4 Organisation for Economic Co-Operation and Development. *West Germany.* (Reviews of National Policies for Education Series). Paris, OECD, 1973. ISBN: 92-64-11006-2.

5 Russell, Russ. "The Organisation of Craft Activities in the Federal Republic of Germany" *Information Paper No. 1725* Coombe Lodge Publications : Blagdon.

6 Sekretariat der Ständigen Konferenz der Kultusminister der Länder in der Bundesrepublik Deutschland (ed).
The Education System in the Federal Republic of Germany.
Sekretariat der Kultusministerkonferenz in co-operation with Bundesminister für Bildung und Wissenschaft and Westdeutsche Rektorenkonferenz 1977.

7 *Vocational Training Information Bulletin.* Supplement on West Germany. Brussels Commission of the European Communities, 1978.
Available from - CEDEFOP, Bundesallee 22, Berlin 15.

8 Wilhelmini Hans-H. The School System in the Federal Republic of Germany. *Bildung und Wissenschaft.* No.12, 1979(e).
Available from - Inter Nationes, Kennedyallee 91-103, D-53, Bonn-Bad Godesberg 1, Federal Republic of Germany.

9 Wilhelmini Hans-H. The School System in the Federal Republic of Germany. *Bildung und Wissenschaft.* N 9/10(e). 1981.
Available as for Item 7.

Further detailed studies, each with its own detailed bibliography, glossary and notes are published in the series :

Studies in Vocational Education and Training in the Federal Republic of Germany — ISSN: 0261 6858

1 Measures to deal with Youth Unemployment in the Federal Republic of Germany

ISBN: 0-907659-06-3

2 Vocational Counselling and Guidance in the Federal Republic of Germany

ISBN: 0-907659-05-5

3 Experiments with the first year of Apprenticeships in the Federal Republic of Germany

ISBN: 0-907659-07-1

4 The Industrial Tutor in the Federal Republic of Germany

ISBN: 0-907659-08-X

5 Basic Full-Time Training in Business Studies and Languages

ISBN: 0-907659-09-8

6 Education and Training of Young Handicapped Adults in the Federal Republic of Germany

ISBN: 0-907659-11-X

7 Learning about the World of Work in the Federal Republic of Germany

ISBN: 0-907659-13-6

8 Education and Training for the Hotel and Catering Industry in the Federal Republic of Germany

ISBN: 0-907659-15-2

9 Education and Training for the Hairdressing Industry in the Federal Republic of Germany

ISBN: 0-907659-16-0

10 Career Development Education in the Federal Republic of Germany

ISBN: 0-907659-17-9

11 An annotated Glossary and Bibliography on Vocational Education and Training in the Federal Republic of Germany

ISBN: 0-907659-18-7

Appendix G

The Federal Republic of Germany (FRG) ranks with the major industrial countries. Its per capita economic product is only slightly below that of the USA. It is one of the largest world traders and its Deutsche Mark is one of the world's highest-valued currencies. The world-wide recession which began in 1974 hit the Federal Republic less hard than other countries, although the recession which began in 1980 has begun to increasingly affect the FRG in such a way that certain numbers and categories of unemployed (older office workers, women and young people) present problems. The reason for this lies within the overall structure of production and export within the Federal Republic.

Approximately 47% of the gross national product of the Federal Republic originates in industrial production (including mining and construction). A feature of the Federal Republic is that agriculture, industry and trade are distributed remarkably evenly from North to South. Its major industrial cities are spread from Hamburg in the North to Munich in the South.

AGRICULTURE, FORESTRY, ETC.

The Federal Republic is not only highly industrialised it also has an efficient agriculture producing about three-quarters of its own requirements. Since World War II farming in Germany has undergone great changes. Whereas in 1950 about 20% of the working population were employed in farming and forestry, it is now just under 7%. Over the same period the number of farms with less than a hectare in agricultural production fell from 1,600,000 to 800,000. The main crops are wheat and feed grains, potatoes, sugar-beet, vegetables, fruit and wine. Livestock of cattle, pigs and poultry predominate with some sheep rearing. Areas of good and indifferent farm land are distributed fairly evenly from North to South.

Forestry is a major activity with the forests concentrated in the uplands of middle Germany and South Germany. Viniculture is a major activity in the middle districts of Germany around the Rhine and Moselle rivers; and in the South of Germany in the Rhine, Neckar and the Main Valleys, where the best wines come from.

ENERGY AND RAW MATERIALS

Compared with its international rank as an industrial nation the Federal Republic is notably poor in raw materials sources of its own. It depends largely on imports for its raw

material and energy needs. Its foreign dependency is particularly great in raw material (eg. copper, bauxite, manganese, etc.). The Federal Republic has its own modest deposits of iron ore, petroleum and natural gas. Only its hard coal, brown coal and salt deposits are sufficiently rich and economic to warrant extraction for many decades to come. There are two immediate consequences of this situation. Firstly, there is a policy for low levels of extraction of oil and natural gas. Secondly, there is a policy to make the energy supplies of the Federal Republic increasingly dependent on nuclear fuels. The plan is that whereas in 1975 2% of energy consumption was derived from nuclear fuels, by 1990 15.7% shall be derived from this source.

INDUSTRY

Although fairly wide areas in Saxony, Hessen and Bavaria have a fairly low concentration of industry, major industries are sited in the North at Hamburg, Bremen, Hannover; in middle Germany in the Ruhrgebiet, and the Saargebiet; and in South Germany in the Rhine Valley, the Neckar Valley and around Munich and Nürnberg. The number of industrial enterprises in the Federal Republic has been falling for years with a corresponding increase in the average size of the industrial enterprise.

Major production areas are iron-making, steel, vehicles, machine and machine-tools, electrical engineering and office equipment, consumer goods and food, drink, tobacco. The FRG is more than self-sufficient in its iron and steel capacity and its chemical capacity which are concentrated in the Ruhrgebiet, Saargebiet and the Rhine Valley. Its vehicle-production is high with a significant export capacity. It is particularly noted for its large scale machine and machine-tool industry which constitutes a major part of its actual exports. In addition, the electrical-engineering and office-equipment industry is very large with fairly large exports in these items of capital equipment. Production in other consumer goods, food, drink, and tobacco is overall greater than the requirements of the Federal Republic.

Overall approximately 25% of the gross national product of the Federal Republic of Germany is exported. Particularly high and important within this structure of exports is the capital-goods industry in vehicles, machine-tools and office-equipment. This high level of dependence on exports (and in particular capital-goods exports) makes the Federal Republic of Germany particularly vulnerable to world wide recession. It is the world recession of 1980 which has raised the unemployment level in the Federal Republic of Germany to 10.2% in March 1983.

COMMERCE AND TRADE

Commercial and trading activities have always been a large part of the overall production of any major industrial country.

This is true of the Federal Republic of Germany which has developed major commercial centres near its sea ports of Bremen and Hamburg (which have been forced to concentrate on commerce since their previous hinterlands before 1939 are now outside the Federal Republic). Other major centres are at Dusseldorf (which is in effect the commercial capital of the Rührgebiet) and at Frankfurt with its major international airport (the second largest in Europe) and its wide range of national and international business and banking connections.

HANDWERK

Large scale national and international activity in manufacturing industry and commerce is supported by a vigorous economic policy to maintain small-scale craft (Handwerk) industries which are specifically recognised as important partners and suppliers to large scale industries. The policy of the Federal Republic for the support of Handwerk, and its associated training, must be seen as a major part of economic policy within the Federal Republic of Germany.[17]

Land	Conventional Abbreviation in Statistics	Capital	Kultusministerium	Area in sq. km.	Population in 1,000's
Baden-Württemberg	BW	Stuttgart	Ministerium für Kultus und Sport, 7000 Stuttgart 1, Schlossplatz.	35,751	9,127
Bayern (Bavaria)	BA	München (Munich)	Staatsministerium für Unterricht und Kultus, 8000 München 2, Salvatorplatz 2.	70,547	10,811
Bremen	BR	-	Senator für Bildung, Wissenschaft und Kunst, 2800 Bremen, Rembertiring 8-12.	404	701
Hamburg	HA	-	Behörde für Schule, Jugend und Berufsbildung, 2000 Hamburg - 22, Hamburger Straße 31.	748	1,672
Hessen (Hesse)	HE	Wiesbaden	Kultusministerium, 6200 Wiesbaden, Luiseplatz 10.	21,113	5,545
Niedersachsen (Lower Saxony)	NS	Hannover (Hanover)	Kultusministerium, 3000 Hannover, Am Schiffgraßen 12.	47,415	7,226
Nordrhein-Westfalen (Northrhein-Westphalia)	NW	Düsseldorf	Kultusministerium, 4000 Düsseldorf, Völklinger Strasse 49.	34,069	17,010

Land	Conventional Abbreviation in Statistics	Capital	Kultusministerium	Area in sq. km.	Population in 1,000s
Rheinland-Pfalz (Rheinland-Palatinate)	RP	Mainz	Ministerium für Unterricht und Kultus, 6500 Mainz, Ernst-Ludwig.Straße 2.	19,839	3,634
Saarland	SA	Saarbrücken	Ministerium für Unterricht, Kultus und Volksbildung, 6600 Saarbrücken, Saaruferstraße 30-32.	2,568	1,077
Schleswig-Holstein	SH	Kiel	Kultusministerium, 2300 Kiel, Düsternbrocker Weg 64-68.	16,696	2,589
Berlin	BE	-	Senator für Schulwesen, 1000 Berlin - 19, Bredtschneiderstraße 5-8.	480	1,918
Bundesrepublik Deutschland (Federal Republic of Germany)	BG	Bonn	Bundesministerium für Bildung und Wissenschaft, Heinemann Straße 2, Bonn.	248,630	61,310
United Kingdom	UK	London	Department of Education & Science, Elizabeth House, York Road, London SE 1.	244,850	55,347

Appendix H

SOME USEFUL ADDRESSES

Embassy of the Federal Republic of Germany,
23 Belgrave Square,
London SW1 8PX.

Central Bureau for Educational Visits and Exchanges,
Seymour Mews House,
Seymour Mews,
London W1H 9PE.

Deutsch-Britische Stiftung für Das Stadium der
Industriegesellschaft,
Alexander von Humbolt-Stiftung,
Jean Paul Straße 12,
5300 Bonn 2.

Anglo-German Foundation for the Study of Industrial Society,
17 Bloomsbury Square,
London WC1A 2LP.

The British Council,
10 Spring Gardens,
London SW1A 2BN.

The British Council,
Hahnenstrasse 6,
5 Köln 1.

Sekretariat der Standigen Konferenz der Kultusminister (KMK),
Nassestraße 8,
5300 Bonn 1.

Bundesinstitut für Berufsbildung (BIBB),
Fehrbelliner Platz 3,
1000 Berlin 31.

Bundesanstalt für Arbeit (BFA),
Regensburger Straße 104,
8500 Nürnberg.

Deutscher Industrie- und Handelstag (DIHT),
Adenauerallee 148,
5300 Bonn.

Prüfungsaufgaben und Lehrmittelentwicklungstelle (PAL),
Jägerstraße 30,
7000 Stuttgart.

Zentralstelle für Prüfungsaufgaben (ZPA),
Unter Sashsenhausen 33,
5000 Köln 1.

Coombe Lodge Publications

The Further Education Staff College was established in 1960 with the principal objective of improving the efficiency of further education establishments. Since 1963 the college has organised study conferences at which senior personnel in education, industry and government discuss and analyse developments in further education and make recommendations for action and enquiry.

It soon became apparent that Coombe Lodge would not be able to accommodate all those who wished to take part in its conferences, so it was decided to develop a report service which would bring the work of the staff college to all those working in further and higher educaton.

What began as reports on selected study conferences has developed into a series of publications on subjects of general interest to the FE service.

Our conference speakers include the leading thinkers and decision makers in the world of further education. Our reports carry their views and ideas to most of the colleges in Britain and to many abroad.

As well as Coombe Lodge Reports, an annual volume of approximately 600 pages, Coombe Lodge publishes other reports, some of which compare the FE system of Great Britain with that of other countries. For details of the full range, write to **Publications, Coombe Lodge, Blagdon, Bristol BS18 6RG,** or telephone Blagdon (0761) 62503.

Our reports are available by annual subscription or single titles may be purchased. Prices of reports are as follows:

Volume	Price per volume	Price of single titles
12	£15.60	£1.20
13	£31.50	£2.25
14	£34.00	£2.50
15	£35.00	£3.25
16	£35.00	£3.25